[**Course Overview**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live)

[**Course Overview**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live)

[Hi everyone, my name's Gail Shaw, welcome](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=0) [to my course: Simulating Production](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=6.6541999999999994) [Workloads with SQL Server Distributed](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=10.757000000000001) [Replay. I'm a technical lead in the data](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=13.884500000000005) [solutions division at Entelect Software.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=17.308833333333332) [The ability to recreate a production](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=19.308) [database's workload on another server is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=21.144600000000004) [an incredibly useful tool to have, and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=23.162) [that's something that SQL Server's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=25.91881818181818) [Distributed Replay makes very easy. In](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=27.80790909090909) [this course, we're going to learn how to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=29.886357142857143) [set up and use the Distributed Replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=31.401214285714296) [feature. Some of the major topics that we](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=33.773333333333326) [will cover include how to install and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=36.11599999999999) [configure Distributed Replay, how to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=37.746) [capture and preprocess a workload, and how](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=39.72100000000002) [to replay that workload against another](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=42.44672727272727) [server and monitor the results. By the end](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=44.738181818181815) [of this course, you'll be familiar with](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=48.96825) [Distributed Replay, and ready to use it in](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=50.5415) [your own environment. Before starting this](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=53.04033333333335) [course, you should be familiar with SQL](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=55.28276923076922) [Server's Profiler tool. I hope that you'll](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=58.124230769230735) [join me on this journey to learn about](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=60.08938461538462) [distributed replay, with the Simulating](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=61.58415384615385) [Production Workloads with SQL Server](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=63.17544444444444) [Distributed Replay course, here at Pluralsight.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=5281a984-6670-40d1-9556-ac042ccf1255&clip=0&mode=live&start=64.931)

[**Introduction to Distributed Replay**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live)

[**What Is Distributed Replay?**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live)

[Hello, and welcome to the course:](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=0) [Simulating Production Workloads with SQL](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=2.9261999999999997) [Server Distributed Replay, recorded for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=5.605714285714286) [Pluralsight. In this module, I want to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=9.249285714285715) [first look at what Distributed Replay is,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=11.789076923076918) [what we might use it for, and then go](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=13.902) [through what the rest of the course will](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=15.646799999999999) [entail. Distributed Replay, usually](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=17.622666666666664) [shortened DReplay, was a feature added to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=19.577600000000004) [SQL Server 2012. It allows for workload](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=23.191) [captured from one server to be replayed](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=26.10475000000001) [against a different server. As its name](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=29.052599999999998) [implies, it allows for the replay to be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=32.085699999999996) [distributed to multiple machines, referred](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=34.70109090909092) [to as clients. These clients perform the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=36.530727272727276) [actual replay process. This allows for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=40.609818181818206) [larger workloads to be replayed without](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=43.3264) [overwhelming the client performing the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=45.263200000000005) [replay. DReplay is also a replacement for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=47.283090909090916) [the Profiler Replay feature, as Profiler](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=50.253) [was deprecated in SQL Server 2012. There](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=53.00150000000001) [are many possible uses for DReplay, but](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=56.002153846153846) [the three that I've used it for are for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=57.767230769230764) [performance comparisons, upgrade tests,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=60.80249999999999) [and to reproduce specific scenarios. Under](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=62.577) [performance tests, I've used DReplay to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=65.91825000000001) [test the effectiveness of changes before](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=68.34479999999998) [deploying them to production, and I've](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=70.314) [also used it for load tests. For the load](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=72.38149999999999) [tests, what I ended up doing was running](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=75.21907692307691) [multiple replays against a single database](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=77.27261538461535) [to get some idea of how much extra load it](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=79.15024999999997) [could handle. The demos we'll be doing in](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=82.5608749999999) [this course are going to fall into this](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=84.66739999999996) [category. We've got some index changes](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=86.56659999999991) [that need to be made to the Interstellar](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=87.93823076923077) [Trading database, and we're going to test](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=89.753) [them for effectiveness using Distributed](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=92.31054545454548) [Replay, before we deploy them to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=94.22187500000001) [production. The one use that I've put](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=96.92112499999996) [DReplay to more than anything else is in](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=98.74371428571432) [upgrade tests; mostly when upgrading from](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=100.574) [SQL Server 2008 or 2012 to 2014 or later.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=103.24199999999998) [There were changes to the Cardinality](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=106.85724999999998) [Estimator in SQL Server 2014, and so some](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=108.75174999999994) [queries experienced performance](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=112.36122222222225) [degradation. This is an area where DReplay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=113.9585555555556) [is extremely useful, and if you're](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=116.10849999999998) [interested in this, have a look at my](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=117.726) [Query Store course, where I go through an](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=119.52371428571428) [upgrade test using DReplay and Query](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=121.79133333333333) [Store. The last use that I've put DReplay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=124.54933333333331) [to is a bit more of an edge case. I needed](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=126.85262499999997) [to trace down the cause of deadlocks on a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=129.77146153846155) [production server, and I couldn't put any](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=132.23953846153847) [monitoring onto the production server](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=134.16163636363632) [because it was already nearly at capacity.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=135.53527272727263) [What I did in this situation was to replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=137.61738461538454) [the production workload against the test](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=140.28466666666668) [server, and put my monitoring on that. For](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=141.96066666666673) [the deadlocks though, it didn't work all](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=144.50507692307693) [that well. They're far too dependent on](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=147.00246153846155) [timing and core execution plans for the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=149.04016666666672) [replay to be able to reproduce exactly,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=150.894) [but the theory does work for other similar](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=152.71346153846162) [situations, such as tracing down data](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=154.9860909090909) [errors that occur somewhere in an import](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=157.12536363636363) [process. The key point here is that the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=159.38966666666664) [monitoring or investigation can't be done](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=161.779) [on the production server, and so the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=163.70140000000004) [process needs to be reproduced somewhere](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=165.99909999999997) [else. The next module of this course will](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=168.0312999999999) [be focused on installing the Distributed](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=170.12700000000004) [Replay components, as well as configuring](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=171.8088181818182) [the security and firewalls. After that, we](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=174.36972727272735) [will capture and preprocess a workload, we](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=177.1126923076923) [will run the replay, and then we will look](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=179.52930769230767) [at the monitoring that we have and compare](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=182.13469230769238) [the results of two replays, one with and one without the index changes.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=57f82d91-824f-440f-b41f-a4318d069372&clip=0&mode=live&start=184.966)

[**Installing and Configuring Distributed Replay**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live)

[**Installing the Distributed Replay Components**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live)

[Hi, and welcome to the Installing and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=0) [Configuring Distributed Replay module.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=3.5808181818181817) [This is part of the Simulating Workloads](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=5.627) [with SQL Server Distributed Replay course,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=7.567272727272726) [recorded for Pluralsight. In this module,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=10.1164) [we're going to have a look at how to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=12.847600000000002) [install the SQL Server Distributed Replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=14.559400000000009) [components, the Distributed Replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=16.691714285714287) [controller, and the clients. Once that's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=18.774) [done, we'll cover the necessary security](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=21.530399999999993) [and Distributed COM setting changes that](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=24.0498) [must be made on the controller, and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=26.09520000000001) [finally, we'll go through the firewall](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=28.40154545454546) [configuration changes that need to be made](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=30.351) [to allow the clients to connect to the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=32.20308333333334) [controller. Before I dive into the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=34.961499999999994) [details, let's take a high level look at](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=36.76076923076923) [exactly what it is that we need to do. We](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=38.874) [have a database server, and for the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=42.55042857142855) [purposes of this module, I'm going to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=44.61592307692308) [assume that it's already installed and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=46.00407692307694) [configured. Installing SQL Server itself](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=47.8173) [is not in the scope of this module. We](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=49.847800000000014) [have a database server, on there we have a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=52.838499999999996) [database, and we want to replay a captured](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=55.99071428571428) [workload against that server. We will be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=59.8855714285714) [capturing the workload from another server](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=62.75815384615385) [from our production environment. Let us](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=64.60846153846155) [assume that this is not our production](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=66.47500000000001) [environment, it generally wouldn't be the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=68.69050000000004) [production environment, this is a test](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=70.69200000000002) [environment that we want to rerun a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=72.714) [production workload against. The first](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=77.26469999999996) [thing we need to do is install the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=79.69366666666667) [Distributed Replay controller, and then](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=81.60833333333335) [configure its service account and set the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=83.69250000000001) [DCOM Permissions. Then we need to install](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=87.43866666666669) [one or more Distributed Replay clients,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=90.35263636363635) [and configure their security. In the case](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=92.565) [of the clients, that's just the service](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=94.85329999999996) [account. Then we need to configure the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=97.17545454545456) [firewalls so that the clients can register](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=99.523) [with the controller, and the controller](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=102.42589999999997) [can dispatch work to the clients, and that](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=104.49725000000001) [the clients can run their workload against](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=106.70325000000003) [the database server. So that's the map of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=109.46233333333335) [what we're going to do in this module. So](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=111.8770769230769) [let's start with the installations. There](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=114.35716666666667) [are three separate sets of installs that](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=117.69571428571429) [we're going to have to do. The first is a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=119.95471428571427) [Distributed Replay controller. You only](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=123.49271428571431) [need one of these for a replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=125.31353846153847) [configuration, and the server that it's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=127.48192307692311) [installed onto should have a good amount](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=129.21133333333336) [of free drive space, as the workload trace](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=130.9275000000001) [files have to be stored there, along with](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=133.20072727272725) [the intermediate files and the results](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=135.81145454545452) [from the replay. How much space exactly](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=138.10781818181812) [will depend on how busy the server was,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=140.29166666666666) [the one that we captured the workload](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=142.363) [from, as well as how long the workload was](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=144.0264999999999) [captured for. I've got clients where a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=146.23815384615386) [half an hour of workload is over 20 GB of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=148.1566923076924) [trace files, so it can be a substantial](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=151.11000000000007) [amount of space needed. The best thing](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=153.586) [here if you're unsure is to do a short](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=155.41199999999995) [test run. Take, say 5 minutes of workload](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=157.84076923076924) [from the server, preprocess and run it,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=160.2518461538462) [and see how much space that requires. You](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=162.34363636363634) [can usually do a linear extrapolation](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=164.72983333333332) [upwards as long as your workload on your](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=166.5768333333334) [server is constant. The second thing that](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=169.13190909090912) [we're going to need to install are the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=171.5023636363637) [clients. How many of these depends on the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=174.31637499999997) [edition of SQL Server. Enterprise Edition](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=177.15881818181813) [allows for up to 16 clients, although I](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=179.20966666666666) [usually use no more than 4. The other](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=181.72433333333336) [editions, however, including](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=185.389) [unfortunately, Developer Edition, only](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=186.907) [allow for a single client. This is one of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=189.14212499999996) [those areas where Enterprise Edition and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=193.1581818181818) [Developer Edition have differences in](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=194.85945454545447) [their maximum capacity. How many clients](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=197.00871428571426) [you need is going to depend on the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=199.06753846153848) [workload you're trying to replay. A very](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=200.82630769230778) [small workload, you can probably get away](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=203.1918333333333) [with a single client, but if you're trying](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=205.888) [to rerun the workload from say, 5000](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=207.744) [connected users, and there's several](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=209.88755555555554) [hundred transactions per second, you're](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=212.3464444444444) [probably going to need more than one;](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=214.57979999999998) [because otherwise, the client's going to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=217.496) [end up in the bottleneck, and that's not](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=218.9709090909091) [what we generally want when we're](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=221.21699999999998) [replaying. The last thing that we will](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=223.25099999999998) [need to install is SQL Server Management](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=225.07753846153852) [Studio, and this needs to go into the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=226.813) [server with the controller. Installing the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=229.63099999999997) [controller installs the Windows service,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=231.80280000000002) [but what it does not do is install the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=233.7098000000001) [executable that we would use to run the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=237.18240000000006) [replays. That executable installs along](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=240.28693333333345) [with Management Studio. It is not, at the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=242.83557142857143) [time of this recording, possible to just](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=245.91421428571422) [install the replay client tools, so we get](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=247.95571428571415) [to install the entire of Management](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=250.50300000000004) [Studio, even though we don't need most of it.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=0&mode=live&start=252.467)

[**Demo: Installing DReplay Controller and Client**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live)

[Enough theory, let's go in and install](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=1.374) [some things. I'm installing this entire](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=4.485888888888889) [configuration on VMs which are set up in](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=6.34) [Microsoft's Azure Service, but you could](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=8.27) [use AWS, VMWare VMs, or Hyper-V VMs](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=11.084600000000005) [installed on a server, or even multiple](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=13.995181818181818) [physical machines if you so wish. The only](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=16.408272727272728) [differences will be in the creation of the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=18.60584615384615) [VMs and the networking setups. The](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=21.102571428571427) [installation of Distributed Replay is done](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=23.714499999999997) [via the SQL Server installer. I'm using](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=25.75749999999999) [SQL Server 2017 here, but the process has](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=28.0625) [been mostly unchanged since SQL Server](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=30.472499999999997) [2012. We want the first option on the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=32.47266666666667) [Installation tab, New SQL Server](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=35.268) [stand-alone installation. If you want to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=38.5872857142857) [run more than one client, the edition has](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=40.79157142857142) [to be Enterprise, which means you will](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=42.54471428571427) [need to enter an Enterprise Edition key](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=44.516076923076916) [here. You will, I'm sure, forgive me for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=46.6623846153846) [blanking mine out. Evaluation Edition will](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=49.8607) [work as well, but it only works for a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=51.794846153846144) [short time, it does expire. The other](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=53.87938461538457) [editions, including Developer, are limited](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=57.00366666666665) [to a single client. This is fine for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=59.04927272727274) [learning, and you can follow along with](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=61.44636363636367) [the demos in this course with only a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=62.8637142857143) [single client, but it's probably going to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=64.354) [be inadequate for most production usages.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=67.55030769230773) [There's nothing particularly in the terms,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=70.29) [rules, and update settings, so I'm going](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=72.31019999999997) [to speed through those quickly. Under the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=75.11049999999999) [instance features, the only thing that we](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=78.00616666666666) [want to install right now is the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=79.66224999999996) [Distributed Replay controller. If you want](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=82.37142857142855) [to put one of the clients onto the same](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=84.41340000000001) [server as the controller, which is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=86.04060000000005) [something I often do, you can install the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=87.42725000000002) [client at the same time. I'm going to do](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=89.67858333333339) [them separately, a later demo in this](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=92.14228571428573) [module will cover the installation of the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=94.137) [client. I'm going to take the default](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=96.64300000000003) [location for the installation, mostly](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=98.35760000000002) [because the VM I'm using doesn't have any](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=99.5469090909091) [other drives. This is just a simple Azure](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=101.82618181818187) [VM. You can leave this at the default if](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=104.02839999999996) [you wish, or you can change the shared](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=106.477) [feature directory to another drive and/or](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=109.11699999999999) [location to fit company policy or personal](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=111.3838) [preferences. If you do change the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=114.69759999999998) [installation location, please note that in](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=116.52808333333334) [later demos, I will be looking under the C](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=118.15658333333334) [program files X86 hierarchy for logs and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=120.99169230769235) [config tools; and if you've installed](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=123.31466666666665) [elsewhere, you'll need to look under your](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=125.47666666666663) [installation location for those logs, not](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=127.63263636363634) [under the program files. I could set the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=129.47653846153844) [service account here to the domain account](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=132.25684615384603) [I intend to use, but I'm going to leave it](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=134.29000000000002) [at the default and change it at a later](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=136.43333333333345) [step, because it makes it clearer some of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=139.0233846153846) [the security changes that are needed if](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=141.36933333333334) [you do so. You can absolutely change it](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=143.09600000000003) [here if you have the domain account](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=145.00016666666667) [already set up, and it is more efficient](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=146.63) [to do so, as setting up the service](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=149.59586666666667) [account here will pre-do most of the DCOM](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=152.58154545454545) [security changes that I'll be making](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=155.70590909090902) [later. All we want to do here is add the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=157.7291333333333) [users who are going to be running the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=160.83446666666654) [Distributed Replay, that's typically the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=162.99844444444437) [person running the installation, or any](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=164.68210000000002) [other domain accounts that might be coming](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=166.99030000000008) [along later to run replays. One last](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=170.3395454545455) [chance to check that everything's selected](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=173.26316666666668) [that needs to be selected, and then we can](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=174.6226666666667) [sit back and watch it install. The](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=177.0280909090909) [installation takes a couple of minutes, so](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=179.00184615384615) [I'm just going to speed this up until it's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=180.22576923076917) [done. That's the controller done. Next up,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=183.20488888888892) [Management Studio. The SQL Server](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=186.92000000000002) [installation put the DReplay controller](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=189.63000000000002) [service in place, but it didn't add the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=192.0390909090909) [executable DReplay. exe that we will need](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=195.1714545454545) [to use to start and stop the replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=197.50740000000008) [process. That executable is part of the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=200.09993333333352) [client tools, i. e. Management Studio.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=202.79400000000007) [This installer has no options or settings,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=205.164) [so it's just a case of sitting back and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=206.5742307692307) [waiting for quite a while. Unfortunately](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=209.124375) [that means that we will have the entire of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=211.57436363636364) [Management Studio when we want a single](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=213.5036363636363) [executable, but that is just the way](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=215.69399999999993) [things are. As before, I'm going to speed](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=217.9993333333332) [this up, as it does take a bit of time to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=219.56662499999993) [install, and probably will require the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=221.44966666666664) [server to be rebooted afterwards. But](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=223.66166666666658) [that's fine, we're done with the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=225.7575) [controller now, I'll come back and do the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=227.27249999999998) [security settings a bit later. The next](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=229.598125) [thing is to install one of the clients.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=231.925) [I'm going to have four in total, but I'm](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=234.145) [only going to show you the installation of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=235.87180000000004) [one. They're all the same and there's no](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=237.56716666666668) [point in making anybody sit through four](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=239.7438333333334) [separate installations of exactly the same](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=242.49099999999996) [thing; and I can tell you, when it comes](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=244.96084615384615) [to installing these things, sitting and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=247.3624615384616) [installing 16 separate client services is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=249.6438461538462) [not a fun job. The installation for the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=252.60553846153857) [client is fairly similar to that of the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=255.41600000000003) [controller, it's installed from the main](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=257.088) [SQL Server installer, and again, it has to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=259.378) [be Enterprise Edition if you want more](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=261.8356666666668) [than one client. When we get to the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=263.67340000000024) [features, select the Distributed Replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=266.3723636363636) [Client, and again, you can change the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=268.2837272727272) [installation location if you desire, I'm](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=270.5363636363638) [going to leave it at the default; and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=272.34346153846155) [again, as with the controller, the service](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=274.33115384615377) [account can be set here, or it can be set](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=276.06623076923074) [later from the services app. The primary](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=278.537) [configuration option for the client, other](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=281.1651818181818) [than the service account, is the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=283.521) [controller name. This needs to be the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=286.08300000000014) [computer name where the DReplay controller](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=289.1800769230769) [is installed. The working end results](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=291.8717692307692) [directories are where the client will](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=293.7028181818182) [write out temporary flies while replaying,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=295.1035454545455) [and where any results from the replay will](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=296.9038181818182) [be stored. They should be on a drive with](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=299.27985714285717) [a decent amount of free space, and in a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=301.51121428571446) [later demo when I do the replay itself,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=303.87199999999996) [we'll have a look at how much space the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=306.028) [replay needed; and now it's a case of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=308.5179999999998) [sitting back and watching it, and once](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=310.6681666666667) [this is finished, I'll go and set the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=312.3837500000002) [client up on the other three VMs that I'm using.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=1&mode=live&start=318.119)

[**Security and Firewall Configuration Changes**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live)

[So the first thing I want to do is set the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=0.822) [service accounts for the controller and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=2.570266666666666) [the clients. I could've done this during](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=3.8240000000000003) [the installation, but I wanted to show it](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=5.987000000000001) [as a separate step. The service account](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=8.901909090909092) [for the controller is just used to run the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=11.298846153846153) [service. It will need access to the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=14.022384615384611) [locations on the drive where the trace](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=15.450692307692304) [files are stored, but that's about all.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=16.764) [The service account for the client,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=19.099083333333333) [however, needs to be granted log in rights](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=21.0925) [on the target database server, and it must](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=23.696499999999986) [have permissions to run the workload. If](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=26.7470909090909) [it doesn't, then during replay, all of the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=29.592384615384617) [commands will fail due to a lack of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=32.44346153846154) [permissions. Once the service accounts is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=37.68180000000001) [set, DCOM, Distributed COM permissions,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=40.553499999999985) [need to be set for the controller. If the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=42.472) [service account is set during the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=44.76353846153846) [installation, then these settings should](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=46.30909090909091) [be made by the installer, but it's still](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=47.6268181818182) [good to check that they're correct. The](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=50.3926) [three changes need to be made for the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=53.221333333333334) [controller service account to be added](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=55.312) [under Launch and Activation Permissions,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=57.113749999999996) [as well as under Access Permissions, and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=58.809999999999995) [finally, the Service Account needs to be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=61.202) [added to the security group, Distributed](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=63.61699999999999) [Com Users. You should also, at the same](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=66.81271428571428) [time, add in any accounts which will be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=69.8678571428571) [used to run Distributed Replay, as in,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=72.421) [from the console start and stop replays.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=77.11100000000002) [Finally, we need to change the firewall](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=81.801) [settings. This section assumes that](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=84.45925000000001) [Windows firewall has not been disabled,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=86.17379999999997) [and that there aren't any third-party](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=88.176) [firewalls installed. If there are](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=90.86774999999997) [third-party firewalls, please consult the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=92.80766666666668) [documentation for those products on how to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=94.54544444444447) [set the rules. For the built-in Windows](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=97.5096666666667) [firewall, the default is to allow outbound](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=99.98127272727272) [connections, and so we only need to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=102.017) [configure inbound connections for this to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=104.28054545454546) [all work. On the controller, we need to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=106.42360000000001) [add a rule to allow inbound connections to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=109.82200000000005) [the controller service, and to the name](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=113.02540000000002) [DReplayController. exe, and then on the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=115.544) [clients, we need to add an inbound rule to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=118.41850000000001) [allow connections to the client service,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=123.03354545454545) [DReplayClient. exe. That should be sufficient.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=2&mode=live&start=126.51463636363633)

[**Demo: Security and Firewall Configurations**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live)

[In this demo, I'm going to go through the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=1.709) [configuration of DCOM for the controller,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=3.8835384615384627) [and the configuration of the firewall for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=5.458) [both the controller and the clients. As](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=7.586000000000002) [before, I'm going to start with a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=12.488444444444443) [controller. The first thing I want to do](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=14.57755555555555) [is change the service account to a domain](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=16.15606666666667) [account that I created for the Distributed](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=17.619) [Replay setup. As I've mentioned before, I](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=20.64299999999999) [could've set this as a service account](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=22.491583333333335) [during the install, but I wanted to show](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=23.87) [it as a separate step. Sometimes,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=25.942000000000004) [especially in a corporate environment, the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=27.583) [account that you want to use might not be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=29.659) [available at the time of running the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=32.227428571428575) [install, or you might not know the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=34.01292857142856) [password, and have to get the sys admin to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=35.25200000000001) [come and enter it for you. The name of the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=36.728) [service is SQL Server Distributed Replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=40.072999999999986) [Controller. Right-click properties, change](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=42.5) [it to automatic if it's not already, I](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=44.678) [have seen some cases where it's not,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=47.7313076923077) [right-click and select properties, change](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=50.023) [the service to automatic, and on the Log](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=53.12744444444443) [On tab, set the desired account and enter](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=56.853571428571435) [its password. You will have to restart the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=59.33871428571431) [service for it to take effect. I have all](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=62.01250000000001) [my VMs running in a domain, and so I'm](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=64.84157142857141) [using domain accounts for all of our](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=67.17128571428566) [services. I'm going to use the same](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=68.75553846153846) [account for the controller and the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=70.24869230769232) [clients. They can be set to different](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=72.067) [accounts if your organization's security](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=74.314) [policy requires that, but I do find that a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=76.34525) [bit overkill for the situation. You can do](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=79.80472727272729) [this restart of the service now or later,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=82.30320000000002) [but I prefer to do it now to make sure](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=83.98640000000007) [that the service will start up under the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=86.06799999999998) [new account, make sure I haven't entered](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=87.72133333333329) [the password wrong, or any of the other](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=89.88861538461538) [misconfigurations that can happen with an](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=92.87950000000001) [account. With the service running under](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=97.10050000000004) [its service account, I need to set the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=98.9097692307692) [DCOM permissions for that service account.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=100.679) [Even if you set up the service account](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=103.667) [during the install, it is a good idea to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=105.92642857142854) [check these settings, they probably will](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=108.728) [be right, but if they're not, this will](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=110.942) [save a whole pile of debugging. We do](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=113.72750000000002) [these changes from the components services](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=116.69277777777779) [app. Expand our computer's My Computer,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=119.44611111111115) [DCOM Config, and the entry we're looking](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=121.87954545454548) [for is DReplayController. Right-click,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=124.85728571428571) [select properties, we want the Security](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=127.29042857142856) [tab, and what we need to do here is add](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=129.48460000000006) [the service account to the Launch and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=131.9286000000002) [Activation Permissions, and to the Access](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=134.43453846153847) [Permissions. Configuration can be left as](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=136.69607692307693) [they are, it doesn't need to be there.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=139.42992307692305) [I'll do the activation permissions first;](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=143.201) [add the service account, and grant it all](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=145.30940000000007) [permissions. It probably doesn't need all](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=148.27899999999997) [of them, but I'm not in the mood for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=150.62499999999991) [debugging this stuff if it breaks. Once](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=153.1171538461539) [that's done, access permissions, add the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=154.91033333333334) [service account, and grant it all the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=156.8743333333334) [permissions again. The last thing we need](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=159.33257142857147) [to do is add the service account into the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=161.85757142857153) [DCOM Users group, that's done from the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=164.3327692307693) [local computers local users and groups](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=166.199) [app. Expand out the groups, look for the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=168.377) [Distributed COM group, and add the service](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=170.20300000000003) [account to that group. That should be the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=171.71175) [last of the security changes needed on the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=173.74975) [controller, so we can restart the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=175.85854545454546) [controller again, and that should be that.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=177.472) [Now I'm going to go across to the client](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=182.375) [and make its security changes. It's much](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=184.7503571428572) [simpler here, all I need to do is change](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=186.5997142857143) [the service account. This one doesn't need](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=188.98342857142868) [the DCOM settings. There's nothing else](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=191.97181818181818) [that needs to be done from the security](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=195.26254545454546) [point of view on the client. We are almost](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=197.43338461538463) [done. The last change that we need to make](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=200.18423529411768) [are to the Windows firewall. With the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=204.2649411764707) [Windows firewalls, we need to allow](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=207.12636363636366) [communication into the controller, as well](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=208.90945454545462) [as communication into the clients. By](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=211.170125) [default, the firewall allows outgoing](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=213.75872727272727) [connections, and so we don't need to set](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=215.29236363636363) [up rules for outgoing connections. Select](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=217.78937499999998) [Inbound Rules, new Rule, we want a program](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=219.76015384615386) [rule, one that will allow any connection](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=222.68138461538462) [to a specific program. We need to enter](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=225.7611428571429) [the full path and name of the controller.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=228.94133333333335) [If the default locations were used during](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=230.984) [the setup, the controller is found under C](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=232.94749999999993) [program files X86, SQL Server, and then a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=235.4777692307692) [number that corresponds with the version](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=238.4851538461538) [you installed. I have SQL 2017, so that's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=240.94966666666667) [140. SQL Server 2016 is 130, 2014 is 120,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=244.73199999999994) [and 2012 is 110. From there, the tools](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=249.121) [directory, DReplay Controller, and select](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=253.65045454545444) [DReplayController. exe. I'm going to take](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=256.5257272727273) [the default on the next tap, allow the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=260.05590909090904) [connection. In my case, I have a domain](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=263.2036923076923) [network, I'm running all my machines on a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=265.416) [domain. Give the rule a sensible name, and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=268.0293333333332) [we're done. Onto the client, and very much](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=271.5254444444445) [the same thing here. Open the Windows](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=274.46139999999986) [firewall, add a new inbound rule. Program](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=277.01966666666664) [specific, full path to the client. Its](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=279.82071428571425) [default installation location will be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=282.5411818181818) [again, C program files X86 SQL Server, the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=284.392090909091) [appropriate version number, tools, and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=287.88519999999994) [DReplay client, for DReplayClient. exe.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=290.62219999999985) [The rest of the settings are the same as](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=293.03119999999996) [for the controller. We can now restart the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=296.97379999999987) [controller, and then the clients, and do](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=299.80723076923084) [make sure that the controller starts](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=301.934153846154) [before you restart the clients, or you'll](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=304.361) [get to do the whole thing over, I mean the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=307.0430588235294) [restart, not the whole configuration. And](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=309.83835294117654) [if everything has been done correctly, the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=311.48025) [logs for each client will contain the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=313.19000000000017) [line, Registered with controller, and the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=315.7496363636364) [controller name. Now, what happens if the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=318.91490909090925) [client isn't connected to the controller?](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=321.7640909090908) [Well the first thing I try is another](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=323.917) [restart of the client just in case. It](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=325.61673333333334) [could've been the controller wasn't](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=327.53085714285714) [available. If that doesn't fix it, the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=329.66514285714294) [first place, to be honest I'd look, is the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=331.8093846153846) [Windows firewall. Firewalls are annoying](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=334.5017272727273) [when you're trying to set up replays.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=336.22354545454556) [While the rule that we've set up should be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=338.63675000000006) [sufficient, I have seen a case in the past](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=341.744) [where it wasn't. If the client won't](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=344.9727499999999) [connect and a restart doesn't help, try](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=347.1618000000001) [disabling the firewall entirely and see if](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=349.3127) [that works. Also consider there might be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=352.68459999999993) [other firewalls in place. If you're doing](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=355.3418888888888) [this on a domain network, consult with](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=357.4624615384616) [your network admins. If you're doing this](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=359.2485384615386) [in Azure or AWS, check the network](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=361.05933333333326) [configuration there as well. That's all](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=362.88866666666644) [the configuration then, we should now have](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=365.09583333333325) [a Distributed Replay controller, one or](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=367.82) [more clients all connected, and we are now](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=370.5607999999999) [ready to capture a workload, process it, and replay it.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=3&mode=live&start=376.388)

[**Summary**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=4&mode=live)

[In this module, we looked at installing](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=4&mode=live&start=1.43) [the Distributed Replay components, the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=4&mode=live&start=3.3549999999999995) [controller, the clients, and Management](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=4&mode=live&start=4.988199999999999) [Studio for the executable that runs them,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=4&mode=live&start=7.0086999999999975) [as well as configuring the DCOM security](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=4&mode=live&start=9.622454545454548) [settings, and making the necessary changes](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=4&mode=live&start=12.075) [to the firewalls. In the next module,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=4&mode=live&start=15.195666666666668) [we'll look at how to capture workloads,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=4&mode=live&start=17.74436363636363) [and to process the trace files in preparation for replay. See you there.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=07b3a408-5c11-456e-a6d0-fe2f1e4937b5&clip=4&mode=live&start=19.474)

[**Capturing and Preprocessing Traces**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live)

[**Capturing a Workload**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live)

[Hi, and welcome to this module Capturing](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=0) [and Preprocessing Traces. In this module](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=3.1500000000000004) [we're going to look at how to capture a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=5.354624999999999) [workload from a server, and some of the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=7.9184999999999945) [considerations around doing so. We will](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=10.671999999999997) [then see how to preprocess the captured](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=13.044533333333332) [workload to prepare it for replay. To](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=15.699399999999995) [capture a workload, we need a server-side](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=18.401111111111113) [trace. These are the server-side portion](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=21.383888888888897) [of the old Profiler tool, and fortunately,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=23.7385) [DReplay doesn't take extended event traces](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=26.636200000000002) [as input, and so we'll have to use the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=29.543800000000005) [older tool. We are not going to point the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=32.85333333333333) [Profiler GUI at the production server and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=35.94253846153846) [hit run, that's a really good way to kill](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=38.8443076923077) [the server. I know, I've managed it](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=42.48284615384617) [before, twice, on the same day. The less](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=45.22307692307696) [said about that incident, the better. The](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=48.15650000000002) [Profiler application can put a lot of load](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=50.530166666666666) [onto a server, especially if it's a busy](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=52.31549999999998) [server. That load can cause performance](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=54.48454545454545) [problems with the application, making the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=56.284) [trace less representative of the workload](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=58.1668) [that we want, and it can sometimes cause](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=60.03545454545454) [server instability and crashes. Hence](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=62.48927272727272) [we're just going to use the server- side](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=64.20436363636364) [component or Profiler, the server-side](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=67.27885714285713) [traces. It is possible to write the script](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=70.32814285714282) [to create the server-side trace by hand,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=72.56146153846157) [but it's extremely tedious and highly](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=74.43745454545454) [error-prone, and hence I want to use](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=77.34418181818178) [Profiler to generate the script for me.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=80.67489999999998) [The trick here is that once any trace has](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=83.925) [been started, it's definition can be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=86.94981818181822) [exported as a. SQL file. It does require](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=89.12644444444446) [that the trace be started, but it can be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=91.77223076923079) [stopped immediately after, and the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=94.06792307692314) [definition then exported. Still, you](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=95.9967142857143) [probably want to run this against a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=97.84272727272726) [non-production server when doing this.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=99.91027272727268) [It's worth saying this again just to make](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=102.033) [a point. Most of the time, running](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=104.90020000000003) [Profiler against production will have no](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=106.92836363636366) [noticeable effects, until the day it does.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=108.502) [By this point, we've got the basics of the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=111.791) [script to create the trace, but there are](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=114.30521428571423) [a few modifications that need to be made.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=116.51663636363638) [There's one mandatory, and several others](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=118.689) [that I recommend. The first is that the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=121.48299999999998) [maximum file size defaults to 5MB. We will](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=125.22000000000001) [want that somewhat larger. How large](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=128.69766666666666) [depends on the workload and how long the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=130.70666666666668) [trace will be run for. It's generally](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=133.09092307692305) [better to overestimate here, because](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=134.9195384615384) [setting the maxfilesize to say, 10GB](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=136.86066666666667) [doesn't mean we get a 10GB file, just that](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=139.698) [we get a maximum of 10GB in the file. The](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=142.57550000000003) [second change is to add an end time. By](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=145.74714285714285) [default, a created trace stops when it](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=148.39442857142845) [fills a file or is manually stopped. We](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=150.55379999999997) [can add an end time so that the trace](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=153.1290625) [stops automatically at a certain time. I](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=155.66762499999996) [like to define it as an offset of the time](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=157.57500000000002) [that the trace is created, in this case, 2](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=159.72500000000005) [hours. The mandatory change is to specify](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=162.74750000000003) [the filename. It needs to be in a location](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=165.77500000000006) [that the SQL Server service account can](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=168.5916875000001) [write to. It should be a local drive, or](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=170.5433750000002) [if network, one with a low latency, and I](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=173.5945) [prefer to avoid the drive with the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=176.77223529411762) [database files on, so as to minimize](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=179.16705882352932) [impact. In the actual call to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=181.561882352941) [trace\_create, you can also change the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=183.48108333333332) [second parameter, the options to 2, this](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=185.3735833333333) [allows for file rollover. In other words,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=188.02899999999994) [if the file size is reached, the trace](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=190.3023076923077) [doesn't stop, it just creates another](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=192.20446153846154) [file. If you do this, set the last](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=193.95723076923076) [parameter to the number of files that you](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=196.51169230769227) [want. With file rollover, it's possible to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=199.29500000000002) [miss the beginning of the workload](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=201.90030000000002) [capture. For example, if we specify 100MB](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=204.29490000000004) [at the file size, and 5 files, and the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=206.89784615384613) [trace reaches over 500MB, the oldest file](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=210.42383333333333) [will be deleted, and a new file will be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=213.76575000000003) [created. Usually I only do this if I](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=216.839375) [expect a large amount of data, and I want](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=219.02787499999997) [multiple files to make moving them easier.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=221.77849999999992) [The other things that the options allow](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=223.982) [for is for what's known as a black box](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=225.49950000000004) [trace, where only 5MB is kept, this is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=227.67392307692307) [usually used for crash dumps, and another](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=230.3016153846154) [option allows for the server to shut down](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=232.5417692307693) [if a trace can't be written to. Not very](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=235.05130769230786) [useful in our case, it's used for security](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=237.33899999999994) [traces. So that's how we capture the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=240.686) [workload, but before I demo this, I'd like](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=242.8395) [to discuss some other considerations for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=245.0656) [the workload, mainly when and for how](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=247.05339999999998) [long; and the answer to when you capture](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=249.64135714285712) [the workload and for how long is really](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=252.7219285714285) [going to depend on what you're trying to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=254.8069230769231) [do with the replay. If you want to replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=256.84142857142854) [a line of businesses workload to test](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=259.4398571428569) [performance, then you probably want to run](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=262.07218181818183) [the trace during peak load. Every system](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=265.163) [is different as to where its peak load is,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=267.272153846154) [it's worth asking the system administrator](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=270.19474999999994) [if you're unsure. If however, you're](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=272.42424999999986) [trying to replay a data warehouse load](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=274.50025000000005) [process or another single large process,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=276.74316666666687) [then the time that the trace runs must be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=278.88333333333344) [when that process runs. The length of the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=282.21906666666666) [trace also depends on the purpose. In the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=284.9155999999999) [first case, a business apps normal](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=287.47676923076926) [workload, I find that an hour or two is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=289.0930769230771) [usually sufficient, I might go for three](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=291.4722666666666) [if I want to make sure I don't miss much,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=293.27873333333315) [but that's probably enough. For these type](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=296.42119999999994) [of applications, the workload is often](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=298.6519090909091) [similar in composition from one hour to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=300.29972727272735) [the next across the business day. It might](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=302.344909090909) [differ in intensity, but you'll probably](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=304.72883333333334) [find that the same processes have been](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=306.4953333333334) [done over and over again. The exception of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=308.52537500000005) [course here is the month end process which](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=310.57346153846163) [will run at month end, and if there's a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=312.24669230769257) [year-end process, that's also going to be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=314.41123076923094) [running at a very specific time. If](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=316.23485714285715) [tracing a single process is a far easier](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=318.5228571428571) [decision, the trace has to run for the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=321.042) [entire duration of that process, and in](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=323.27399999999994) [that case, I recommend giving a little bit](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=324.9408461538461) [of leeway in case the process runs longer than expected.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=0&mode=live&start=326.60053846153835)

[**Demo: Generating a Workload**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live)

[In this demo, I'm going to create a trace](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=1.218) [script using Profiler, edit it, and then](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=3.9817500000000003) [capture my workload. I'm going to start](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=6.641857142857142) [with SQL Server Profiler, because as I](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=8.86323076923077) [mentioned in the slides, I don't want to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=10.468384615384617) [try writing the trace script by hand.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=13.073153846153843) [Create a new trace, either with the first](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=15.577) [button on the left on the toolbar, or via](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=17.05871428571428) [the file menu. Connect to a non-production](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=19.479909090909093) [server. The version's not very important](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=22.53636363636364) [here as long as it's something more recent](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=24.21175) [than SQL Server 2000. I suspect that won't](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=26.360666666666667) [be a problem. The only thing that we want](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=29.67799999999999) [to change on the trace properties is the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=32.122) [template, we need the TSQL\_Replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=33.722) [template. Once that's selected, start the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=36.51699999999999) [trace, and then stop it immediately. We](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=38.924181818181836) [can get at the definition via the File](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=41.4339090909091) [menu, Export, Script Trace Definition, and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=43.76918181818185) [we'll save that somewhere convenient](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=46.154333333333334) [because we're going to edit it in a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=48.406) [moment. The next step requires Management](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=51.95355555555556) [Studio, or any other query editor that you](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=53.81836363636364) [like to use. I'm going to use Management](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=56.280727272727276) [Studio. The changes I need to make to the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=59.30763636363638) [script are to set the filename, add an end](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=61.61114285714287) [date, and change the file size. The](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=64.14466666666667) [default size of 5MB is definitely not](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=66.62491666666666) [going to be enough, I've got a fairly](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=68.73133333333332) [small workload, so I'm not expecting 20 or](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=71.17623076923076) [30GB. I'll set my max at 1GB, it's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=73.65869230769226) [probably far larger than I need, but I do](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=76.04756249999998) [prefer to err on the side of caution. In](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=78.72) [time, I'm going to set that as an offset](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=81.00779999999997) [to the time the script is run, that is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=83.16640000000001) [when the trace starts, and for this one](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=85.06660000000004) [I'm going to set 3 hours. This is on the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=87.46318181818182) [high side of what I usually use. For](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=90.76590909090906) [normal business workloads I seldom use](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=93.19336363636364) [more than 2 hours. In this case though,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=95.29554545454548) [I'm simulating a workload using a little](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=97.73481818181818) [application because I don't have an actual](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=99.551) [production server, and so I don't have a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=102.38211111111116) [lot of concurrent activity, I'm going to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=104.67385714285717) [need the 3 hours just to get a decent](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=106.4038571428572) [amount of workload to replay. This trace](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=109.6977692307692) [is only going to run once, so I'm going to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=112.121625) [use a fixed filename. If I was going to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=114.71974999999995) [put this into a schedule job or I planned](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=116.63752941176472) [to run it multiple times, I'd instead](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=118.21888235294121) [create the filename to include the current](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=120.0158181818182) [date and time, because if the script runs](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=122.238) [and the file already exists, it will fail.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=124.65646153846154) [Now my simulated workload. This is nothing](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=128.38157142857142) [fancy, it's just an application that runs](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=132.1015454545455) [four different queries in my database](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=133.8948181818183) [randomly. With that running, I can start](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=136.11183333333335) [the trace, the file gets created as soon](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=138.08569230769226) [as the trace starts, it will be listed as](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=140.20520000000002) [0 bytes for quite some time, that's just](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=142.6730000000001) [because it's open and being written to,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=144.97430000000003) [and SQL Server does not update the files](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=147.145) [properties. As soon as the trace stops,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=150.48277777777778) [which will be 3 hours from now, the file](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=152.23615384615388) [will be set to whatever its actual size is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=154.35557142857144) [at that point. So I'm going to leave](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=156.87814285714296) [things here for now, this is going to take](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=158.69299999999993) [3 hours to run, and we'll go back to our slides.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=1&mode=live&start=160.4461999999998)

[**Preprocessing a Workload**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live)

[We now have our workload captured in the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=1.963) [form of one or more. TRC files. They](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=4.817933333333335) [cannot be replayed as they are, they](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=7.704083333333333) [require a preprocessing step. We do this](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=10.420666666666673) [with the DReplay command line tool. This](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=12.987333333333334) [is installed with Management Studio. When](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=15.395) [I did the initial setup in the previous](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=17.544538461538462) [module, I installed this onto the same](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=19.580846153846164) [server as the controller. It can be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=21.478249999999996) [installed elsewhere if you prefer though.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=23.52983333333332) [The only two mandatory parameters to the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=25.34836363636363) [DReplay preprocess are the file to be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=27.505) [processed, and the location where the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=30.560181818181814) [results must be written. These must both](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=32.804923076923075) [be as seen from the controller, not from](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=34.551153846153845) [the machine where the DReplay preprocess](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=37.09881818181818) [has been run from. If the trace paths are](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=39.423545454545454) [part of a rollover set, then the input](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=42.45223076923079) [file should be the first file of that set.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=45.06925) [The output location is a directory, not a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=47.968) [single file, as the output consists of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=50.137230769230754) [multiple files, even if the input was only](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=52.06576923076923) [a single file. I recommend having an easy](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=54.35684615384613) [to type location, as you'll be typing this](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=56.61061538461539) [into the command line repeatedly, or](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=58.842) [putting it in a batch file if you prefer,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=60.378428571428586) [and it's easy to make mistakes when typing](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=62.750076923076925) [in the entire C program files hierarchy.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=65.33469230769232) [The other parameters are optional; -m is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=68.19163636363638) [the controller name, if this is not being](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=71.8424545454546) [run on the controller, it defaults to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=74.26672727272724) [localhost, -f adjusts how often the status](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=76.9808181818182) [messages will be outputted, and if you're](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=80.77672727272731) [using a non-default configuration file, -c](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=83.5948) [is the path to that file. The default](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=85.94369230769232) [configuration file is found under the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=89.2704615384616) [tools bin folder rather than the tools](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=91.56472727272727) [DReplay controller folder, and it is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=94.00709090909089) [called dreplay. exe. preprocess. config.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=97.51899999999998) [So let's have a look at the contents of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=100.682) [that config file. It only has two options](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=103.14575000000005) [in it, and these are whether to include](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=105.22878571428569) [the system sessions, and whether to change](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=107.24764285714278) [the max delay between commands. If the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=110.25400000000002) [include system sessions option is set to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=113.37280000000001) [yes, then any operations that the trace](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=116.25610000000003) [caught that were being run by system](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=118.22300000000004) [processors will be included in the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=120.3048888888889) [preprocessed files. Most of the time](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=123.46622222222224) [though, we're interested in the user](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=125.5829090909091) [workload, not what the server was up to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=127.17727272727275) [itself, so I'd probably leave this at the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=129.403) [default of no, in most cases. The second](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=131.74676923076922) [option allows for the idle time between](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=134.81692307692296) [commands to be reduced. Let's say that we](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=137.66257142857145) [had a data warehouse load we wanted to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=140.42107692307687) [replay, where the steps run every 30](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=142.4432307692306) [minutes, and take between 15 and 25](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=144.47430769230775) [minutes to execute. There are idle gaps in](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=146.549) [that trace up to 15 minutes long, and we](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=149.00930769230766) [don't need that in the replay. The max](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=151.59459999999999) [idle times allows you to specify the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=153.8011666666667) [maximum duration in seconds of an idle](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=156.0242500000001) [period in the replay. In general though,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=158.3413636363637) [most of those options can be left at their defaults, in most cases.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=2&mode=live&start=160.729)

[**Demo: Preprocessing a Trace**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live)

[In this demo, I want to preprocess the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=1.675) [trace so that it is ready for replay. At](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=4.8035000000000005) [this point, we've captured our workload,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=8.159500000000001) [and now I want to show the preprocess](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=9.524499999999996) [step, so that the trace is ready for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=11.5236) [replay. I'm running this from the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=14.776399999999994) [controller itself, and I've copied the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=16.506749999999997) [trace file from the server where it was](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=18.095249999999993) [captured to the local drive. I'm not using](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=20.933083333333325) [a specific config file in this case, and I](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=23.43571428571429) [don't care about the status updates, so](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=25.42985714285716) [I'm going to run DReplay preprocess with](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=27.74425) [only the required options; -I for the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=30.364) [input file, and -d for the output](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=33.622733333333336) [directory. If this throws errors that the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=36.88146666666667) [DReplay controller can't be contacted,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=39.52609090909089) [then it is likely that the user running](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=41.342) [the command has not been added to the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=43.36714285714284) [distributed COM group, or they don't have](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=45.49309090909092) [the correct permissions under the DCOM](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=47.617909090909116) [settings. If they process throws an](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=49.84619999999999) [unexpected error, with an exclamation](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=52.278) [mark, it's probably also due to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=55.051333333333346) [permissions. I'd say check the controllers](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=58.37933333333336) [log, but while most errors will indeed be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=60.75108333333333) [logged in there, what is logged is usually](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=63.72772727272727) [completely useless. In most cases, it's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=67.18954545454548) [just a hex or decimal error code. About](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=69.2546363636364) [the only thing you can do with it is punch](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=71.52671428571429) [it into Google, and see if anybody else](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=73.25385714285721) [has run into that and blogged about it.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=75.45661538461536) [The one exception and the one case that I](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=78.152) [need to call out specifically is if you're](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=80.04130769230768) [running SQL Server 2017 RTM, and the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=82.84599999999998) [version of Management Studio installed is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=86.28474999999993) [one of the 17. x series, and the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=89.00872727272728) [preprocess or the replay throws an](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=92.431) [unexpected error with an error code of 0x](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=94.65999999999998) [and eight 0s, it's a bug. Update to the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=98.02000000000002) [latest CU; and that's the preprocess](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=102.48670000000001) [complete. The next part will be the replay.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=3&mode=live&start=105.79810000000003)

[**Summary**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live)

[Before we go any further, let's pause for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=0.896) [a minute and take stock of exactly where](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=2.5748571428571436) [we are. We have installed the Distributed](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=4.5754) [Replay controller and clients, we've](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=7.170300000000002) [performed all of the necessary](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=9.104111111111113) [configuration, we've configured security,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=11.058) [DCOM, and firewall, and all the clients](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=13.39114285714286) [are successfully connecting to the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=16.5402) [controller. We've created a trace group](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=18.28919999999999) [with the assistance of Profiler, have run](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=20.160000000000007) [it, and we have our workload captured as](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=22.282714285714288) [one or more. TRC files, and we have](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=24.689571428571437) [preprocessed that trace. The next step is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=28.11014285714286) [to run the replay against our server,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=31.077727272727277) [capture the results, and see whether the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=33.361) [index changes which we're testing - which](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=35.439999999999976) [is the whole reason for doing this process](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=37.499249999999996) [- will improve the overall performance of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=39.82258333333332) [the server or not; and that's what we'll](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=42.08639999999998) [be doing in the next module. See you there.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=0d36014f-2c6e-474c-899d-ee0ec39f2071&clip=4&mode=live&start=44.38879999999999)

[**Replaying Traces and Capturing Results**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live)

[**Destination Database and Replay Options**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live)

[Hi, and welcome to the module on Replaying](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=0) [Traces and Capturing Results. We're almost](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=4.755333333333334) [done with our journey. The only things](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=7.615769230769231) [left to do before we can tell whether](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=9.305461538461543) [those index changes we're testing will](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=11.304454545454547) [benefit the workload or not, are to run](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=12.854636363636367) [the replay and analyze the results for it.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=15.391733333333327) [First though, I want to discuss some](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=17.996) [aspects of the destination database that's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=19.779090909090908) [used to run the trace against. Then we'll](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=21.6705) [look at the replay process itself, and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=24.887800000000002) [finally, we'll discuss the options we have](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=26.98710000000001) [for monitoring the replay. The starting](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=29.4818) [state for the destination database is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=31.577399999999997) [something that should be carefully](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=33.4746) [considered before starting any replay. It](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=35.59312500000001) [must be a copy of the database that the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=38.27728571428572) [workload was captured from, or the replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=40.142857142857174) [will throw a whole pile of errors, but](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=41.738200000000006) [there is more to it than that. When that](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=43.78140000000002) [copy was taken is something that needs to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=46.367642857142854) [be decided, and it's going to depend on](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=48.871071428571426) [what you want the replay for. If you're](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=51.820307692307686) [replaying a workload to test results, or](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=54.783) [if the application is very dependent on](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=57.24350000000001) [database state, then the destination](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=59.93719999999999) [database must be restored from a copy](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=61.986199999999975) [taken right before the workload was](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=64.15950000000001) [captured, preferably with the capture](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=65.923) [trace being started right as the backup](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=68.10915384615383) [finishes. If you don't do this, if the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=71.16976923076919) [database is from another point in time,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=73.513) [then your results are going to be fairly](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=75.419) [useless, and if the application is very](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=77.77766666666663) [dependent on the database's initial state,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=80.13033333333334) [you may even get a whole pile of errors,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=82.477) [or completely meaningless results. If](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=86.52492307692312) [however, you have a read-heavy workload](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=88.63872727272727) [that doesn't vary much over time, then a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=90.52709090909087) [backup taken after the trace was run is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=93.08384615384614) [probably going to be okay. Another](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=95.67953846153841) [consideration is that if you have a lot of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=97.42042857142856) [queries filtered for the current date, via](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=99.97) [GETDATE or other functions, and you](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=102.84318181818179) [capture a trace and run it a week later,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=104.95353333333334) [the queries run by the replay will be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=107.06193333333337) [looking to filter for the date that the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=108.86157142857141) [replay runs on, not the date the workload](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=110.58671428571424) [was captured for. So this is also](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=113.32066666666668) [something you need to keep in mind when](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=115.28342857142856) [selecting a backup to restore your](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=116.90628571428569) [destination database from. So the replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=119.11657142857142) [process itself is fairly simple. It has](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=121.52600000000001) [two phases; first, the controller](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=123.96272727272728) [distributes the workload to the clients,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=125.65454545454547) [and then the clients execute that workload](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=127.69218181818182) [in parallel against the target server. The](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=130.08681818181813) [clients are the ones that execute the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=132.33766666666665) [workload, and they connect to the server](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=134.531) [and run the queries under their service](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=136.37724999999992) [account, not under the account that ran](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=138.30983333333333) [the query and the captured workload. Hence](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=140.45825) [it's important to make sure that the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=142.5891818181818) [client's service account has access to the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=144.707) [target database. I usually just make it](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=147.31799999999993) [the DB owner for simplicity. I strongly](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=149.86750000000004) [recommend that traces are replayed against](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=152.3172) [a dedicated server, not a shared](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=154.25580000000008) [development server, and never a production](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=156.75399999999996) [server. There's two main reasons for this.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=159.53199999999993) [First, the replay will generally stress](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=162.01590909090913) [the server. We'll look at the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=164.1165) [configuration file later, but to summarize](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=166.61550000000008) [quickly here, the default settings for the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=168.87424999999996) [replay is to run the workload as fast as](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=171.22916666666652) [possible against the destination server.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=174.67924999999997) [Hence if we replay the trace against a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=176.663) [shared server, any concurrent workload on](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=179.00060000000008) [that server will affect our trace results,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=181.0675454545454) [and the replay will negatively affect any](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=183.662) [shared workload. The second reason I'd](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=186.95511111111108) [recommend this is because the replay is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=189.0313846153846) [instance wide. It's not specific to a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=191.0183076923077) [single database, it's everything that was](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=193.26145454545448) [captured by that trace that ran against](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=195.272) [the initial server, which, for the default](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=197.82509090909085) [replay template is everything that was](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=200.33209090909094) [running against that server, including](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=202.42827272727283) [queries against master or MSDB. Onto the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=204.99224999999998) [replay process itself. As with](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=208.90536363636363) [preprocessing, the replay is run from the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=210.9162727272727) [command line with the DReplay executable.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=213.52466666666666) [This time, the option is DReplay replay.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=215.524) [The important parameters here are the -d,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=218.85810000000006) [-w, and -s; -d specifies the working](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=222.355) [directory. That's where the process trace](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=225.97399999999996) [files are. Do note it's a directory, it's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=228.4817142857143) [not a specific file; -w is the list of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=231.1043999999999) [clients, comma-delimited and without any](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=233.844) [spaces. These clients must all be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=237.29983333333337) [registered with the controller before you](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=239.49918181818182) [can run a replay using them; -s is the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=241.309) [server against which you want to run the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=244.18450000000004) [replay. It's not mandatory, but if it's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=246.84515384615386) [not specified at the command line, the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=249.3258461538462) [server must be specified within the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=251.5018) [configuration file, and personally, I find](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=253.171) [it easier to specify at the command line.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=255.4462857142857) [If you do use different config files for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=258.48) [different servers, it may be easier to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=260.63446153846144) [specify the server there. One limitation](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=262.7311666666667) [to note is that both localhost and dot are](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=264.9816666666668) [invalid as server names, it must be in the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=268.3505714285715) [form of the server name, the machine name](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=271.714) [itself, or server name/instance name if](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=274.8553333333335) [you haven't named a SQL instance. As with](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=277.22572727272734) [the preprocess phase, -f controls how](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=280.3317272727273) [often the status messages are displayed,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=282.52990909090914) [and -c is an optional path to a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=284.7971538461538) [configuration file. If not specified, the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=287.91223076923046) [configuration file under C program files](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=290.3193636363637) [X86 tools DReplay controller is the one that is used.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=0&mode=live&start=292.7619090909092)

[**Replay Config File**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live)

[The config file for the replay process is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=1.817) [more complicated than for the preprocess,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=4.207) [so I'm going to break it into two](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=6.042181818181818) [sections; first for the options used on](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=8.602909090909089) [sending the commands, and second for the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=10.747461538461542) [options on the output. The config file for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=12.876) [the replay is more complicated than the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=15.288000000000006) [one for the preprocess was, so I'm going](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=17.275999999999996) [to break it into two sections - one for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=19.36133333333332) [the options on sending the commands, and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=21.74015384615386) [one for the options on the output. In the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=23.785111111111114) [first section, we mostly have options for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=26.882454545454546) [controlling the timing of the commands.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=28.889545454545456) [The first option we have is for server](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=30.89530769230769) [name. As I mentioned earlier, I personally](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=33.759923076923066) [find it easier to specify the server at](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=35.65800000000001) [the command line, and so I usually leave](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=37.841249999999995) [it blank in the config file. For](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=40.414249999999974) [sequencing mode, there are two options -](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=42.84109090909091) [stress or synchronized. If the mode is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=46.32072727272726) [stress, which is the default, then both](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=48.724307692307704) [the time between when the connections are](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=50.32084615384619) [made and the think time, or the time](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=52.26392307692308) [between the queries, can be scaled with](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=54.643) [two other options in the config file -](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=56.75583333333334) [ConnectTimeScale and ThinkTimeScale. These](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=60.565) [two are integers, both between 1 and 100,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=63.24807692307692) [and they are percentages. A value of 100](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=66.31269230769233) [means that the times are unchanged from](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=68.89585714285712) [what was found in the workload trace](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=70.7348571428571) [itself. When running in synchronized mode,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=73.31660000000002) [an automatic health monitor can be run.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=76.007) [The default frequency for this is every](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=78.11272727272731) [minute, you can change the interval with](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=80.23850000000002) [this option, the value is an integer, and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=82.39100000000005) [is the number of seconds between when the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=84.73014285714288) [health monitors run. Set it to -1 to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=87.029) [disable the health monitor entirely. The](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=90.53853846153845) [QueryTimeout is much the same as an](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=93.05966666666667) [applications query timeout setting. It is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=95.35333333333338) [how long the DReplay client will wait for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=97.25099999999999) [a query to complete before signaling SQL](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=99.59899999999995) [Server to terminate it. The default here](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=102.21514285714285) [is 60 minutes. This is well in excess of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=105.1657142857143) [most data access libraries or applications](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=108.24885714285719) [used where the defaults are usually 30](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=110.56566666666666) [seconds. Still, if you do want to disable](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=113.42108333333331) [the timeout, set it to -1, and the DReplay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=115.8541538461538) [clients will wait forever.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=118.59328571428573) [ThreadsPerClient defines how many replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=119.931) [threads each client will use. I've](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=122.22449999999998) [personally never needed to change this,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=124.76323076923077) [but if you do have decent machines running](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=126.23461538461541) [the clients and you can't stress the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=128.29836363636363) [server enough with 16 clients, it may be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=130.37163636363638) [worth investigating turning this up to see](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=133.30861538461534) [if you can get more stress on your server.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=136.044) [The EnableConnectionPooling controls where](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=138.506) [the clients will use connection pooling,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=139.97349999999997) [that is whether they will return a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=141.95572727272727) [connection to the pool instead of closing](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=143.75727272727272) [it once they're done; and finally, the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=145.98427272727278) [StressScaleGranularity controls where the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=148.51944444444445) [connections for a single SPID, a single](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=150.44122222222228) [session that is, should be scaled together](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=153.36472727272727) [or separately in stress mode. The options](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=155.70209090909088) [here at SPID or connection. The second](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=158.80799999999994) [portion of the config file controls the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=161.7056923076923) [output from the replay. There are two](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=163.76261538461532) [output options. The first controls whether](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=165.91954545454547) [the row count for each query is recorded,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=167.88263636363644) [and this defaults to yes; the second](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=170.82245454545452) [controls whether the entire results set is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=173.4658) [recorded, this one defaults to no. I'd](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=176.0515999999999) [recommend against enabling the second for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=178.74627272727275) [most purposes. For longer traces or busier](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=181.08377777777778) [servers, there's going to be a lot of data](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=183.88222222222228) [coming back. Probably the only time you'd](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=187.06440000000006) [want to enable this is when you're trying](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=188.82076923076926) [to reproduce specific behaviors with the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=190.518) [replay, where the output is important, or](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=192.61199999999994) [you're testing for functionality](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=195.07277777777776) [differences in an upgrade, and as a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=196.50433333333328) [result, the output of the queries is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=198.6263333333333) [important. That's pretty much that for the config files.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=1&mode=live&start=200.46091666666655)

[**Demo: Running a Replay**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live)

[In this demo, I'm going to run the replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=1.538) [itself. First with the default](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=5.802199999999998) [configuration settings, and then twice](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=7.700727272727274) [more - once in synchronized mode, and once](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=9.481636363636367) [in stress mode, and I want to see how the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=11.68671428571429) [replay process differs each time. Before I](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=14.774428571428572) [start with the replay itself though, I](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=17.884285714285717) [want to show you one of the other options](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=19.166285714285724) [on DReplay, and that's DReplay status.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=21.982400000000005) [This is a great way to see which of your](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=24.833) [clients have registered with the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=26.62871428571428) [controller, and I can see by running this,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=27.5962) [that only two out of my four clients are](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=29.589799999999986) [connected. So before I can even start the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=32.1105) [replay, I need to go and figure out what's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=34.84516666666667) [wrong with the other two clients. In my](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=36.951571428571455) [case, it's just that I haven't started the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=38.77566666666666) [VMs yet, I'll do that in a moment. But](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=40.7783333333333) [this is really useful for seeing whether](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=43.39500000000001) [your clients are ready for replay, whether](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=45.783750000000026) [they've connected, whether they've](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=48.072749999999985) [registered, without having to try and run](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=49.40218181818182) [a replay. I've got the other two clients](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=51.7828181818182) [booted and connected, so let's start the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=55.10128571428573) [replay. I'm not doing the output this](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=58.17928571428575) [time, this is just going to be a single](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=59.82900000000001) [replay to see how it runs, so the only](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=61.644) [options I'm going to give it are the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=64.04339999999998) [server name, using -s, the folder where](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=66.31438461538463) [the files are stored, with -d, and then my](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=68.66423076923081) [comma-delimited client list, with -w. If](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=73.04799999999999) [you remember from the slides, the replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=76.40507692307692) [process runs in two phases. First, we](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=78.61761538461536) [dispatch all of the events to the clients,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=80.67076923076924) [and then the clients run the replay. This](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=82.56184615384622) [is the first phase, the dispatch, this](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=85.13645454545453) [generally only takes a couple of minutes.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=87.603375) [If you've got a really large workload it](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=89.202) [might take longer though. A quarter](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=92.15333333333331) [million events dispatched in 2 minutes,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=94.33216666666668) [and now the replay process will start](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=96.4416666666667) [itself. This will take a while, so I'm](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=98.96884615384617) [going to pause the recording here, and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=101.9577692307693) [we'll come back once it's finished. Our](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=104.23727272727271) [first replay is finished, and it took just](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=106.39433333333332) [under an hour. Before I go on to look at](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=108.94099999999995) [the synchronized and stress modes though,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=111.66807692307695) [I'd like to quickly chat about those](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=113.187) [results. The output that DReplay posts is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=115.73849999999996) [mostly just so you can keep track of how](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=117.75899999999997) [far you are in the trace and how much time](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=120.27921428571429) [is estimated remaining. There's one piece](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=123.4013571428572) [of information in there that I'd like to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=124.96824999999998) [call particular attention to, and that is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=126.64891666666662) [the pass rate. This is what percentage of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=129.33299999999997) [commands were run against the target](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=132.57769230769225) [server succeeded. If the target server is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=134.98692307692295) [configured correctly, it should be in the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=137.23000000000005) [90s. If you have a very low pass rate,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=139.24600000000012) [something's wrong with your target server.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=142.1802857142858) [It could be that the client's service](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=144.165) [account doesn't have permission to run the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=146.2726363636363) [queries, it could be that the database is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=148.5456923076923) [named incorrectly. Whatever it is, your](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=151.3955384615384) [queries are failing, and you probably want](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=153.27033333333333) [to find out why before you do much more](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=155.30441666666664) [work. This is one area where the output](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=158.50077777777776) [trace from DReplay is useful, because it](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=161.20783333333335) [will have all the error messages in it.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=163.57139999999998) [Onto synchronized and stress. I'm going to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=166.329) [make one change to the configuration file](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=168.38524999999993) [for the first test, and that's just to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=170.4455) [change the sequencing mode from stress to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=172.8115) [synchronization, and I'll start another](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=175.28900000000004) [replay, I'm only going to use two clients](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=177.175) [at this time. I don't actually need all](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=179.0673636363636) [four of them, this is not a large](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=181.05235714285712) [workload. So we'll kick that off, and wait](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=183.09292857142853) [a bit, and come back when it's done.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=185.52219999999997) [Little under an hour, and it's done. About](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=188.007) [the same amount of time as our first test](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=189.70814285714295) [was, not really a surprise here because](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=191.86669230769235) [the value of stress mode, which is what it](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=193.9263076923078) [was set to in the first case, is when you](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=196.17700000000005) [drop the connect and think times from 100](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=198.5089230769231) [to something lower, which is what we're](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=200.47138461538475) [going to do right now. I'm going to turn](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=202.4775) [the configuration option sequencing mode](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=205.2726363636363) [back to stress, and then turn connect and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=206.8721818181817) [think time scales down to 10. That's 10%](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=209.97150000000005) [of what they are in the original trace.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=213.2094) [Save that, and kick off another trace,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=216.323) [again with only two clients, and sit back](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=218.49474999999998) [and watch it run. It ran much faster this](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=221.7257692307692) [time, 13 minutes instead of 54. This is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=226.76507692307683) [the value of the stress mode, you can make](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=230.00438461538468) [the trace run faster against the server, you can stress the server more.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=2&mode=live&start=233.0879230769231)

[**Monitoring Results of a Replay**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live)

[Often when we're running replays, the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=0.81) [performance of the queries is of interest.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=2.7406153846153845) [This could be because we're doing](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=4.993) [regression tests, we could be doing stress](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=6.4819999999999975) [tests, or as in the example that we're](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=8.229153846153846) [working through in the demos, we could be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=10.294384615384612) [testing application changes. There are](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=13.835571428571429) [three main ways to capture the performance](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=16.315133333333335) [of queries run by Distributed Replay.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=18.408600000000014) [Those are built-in trace, extended events,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=20.203) [and the SQL Server Query Store. The](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=22.765499999999992) [built-in trace is an automatic Profiler](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=25.719153846153844) [trace captured by the replay controller.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=28.066076923076913) [To enable it, add the -o parameter when](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=30.413) [running DReplay. Personally, I don't like](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=34.03939999999999) [this option. Firstly, I'd rather not be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=36.134363636363645) [using Profiler traces 6 years after it was](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=38.214) [deprecated; and secondly, I can't change](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=42.66199999999998) [the definition of that trace. I can't add](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=45.4235) [extra columns, I can't add extra events;](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=48.36075) [and Profiler, since it's been deprecated](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=50.96183333333334) [for 6 years, hasn't had any new features](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=52.88799999999999) [added to it, which means I can't in a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=55.254) [Profiler trace get things like the query](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=58.20728571428572) [hash, which make it very easy to aggregate](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=60.59030769230769) [and analyze queries. To be honest, the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=63.55953846153845) [only time I'd use this option is if I](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=65.41993333333335) [didn't have any control over the target](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=67.10053333333337) [server that I'm running my replay against,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=69.04608333333331) [and that's a kind of odd situation to be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=71.247) [in. My preference is for an Extended](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=74.31870000000004) [Events session set up on the target](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=76.4047142857143) [server. This will be a custom Extended](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=78.44021428571433) [Event session, whatever events I want,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=80.32150000000001) [whatever columns I want, and saved to a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=81.912) [file on the target server. This way, I can](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=84.35076923076926) [specify the exact events I want, I can](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=87.12353333333334) [have my query has, I can have anything](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=89.62060000000002) [else that I might need to help me](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=91.92199999999998) [aggregate and analyze my results; and a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=94.10599999999995) [final option on SQL Server 2016 and above](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=96.467) [is to enable Query Store on the target](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=99.36250000000001) [database before running the tests. Query](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=103.03850000000006) [Store captures all query performance data](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=105.694875) [automatically, and makes it very easy to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=107.84812499999998) [do the before and after comparisons. There](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=110.11699999999996) [were even built-in reports that will track](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=112.2835) [performance changes over time for you with](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=114.07900000000002) [no additional work necessary. The](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=117.08311111111112) [disadvantage here is that because Query](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=119.34223076923077) [Store is part of the user database, you](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=120.93961538461541) [can't restore the database back to a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=123.23166666666668) [starting point for the second trace](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=125.66300000000005) [without losing the Query Store data. You](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=128.00033333333334) [could certainly rename the database, or](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=130.83992307692307) [take a backup of it and use it later, but](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=132.33346153846145) [then you're back to analyzing the data](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=135.00133333333338) [manually, which removes a lot of the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=137.0564166666668) [advantages of Query Store in the first place.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=3&mode=live&start=143.35)

[**Demo: Monitoring Results of a Replay**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live)

[In this demo, I'm going to go through the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=1.242) [results that were obtained from running](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=3.4089230769230765) [the Distributed Replays. I'm going to go](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=5.004909090909091) [through this fairly briefly because this](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=7.220090909090912) [isn't really part of DReplay itself, it's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=9.733400000000001) [just some examples of how you can keep an](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=12.9210625) [eye on what DReplay is doing. The first](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=16.224624999999996) [one I want to have a look at is the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=19.017266666666664) [built-in Profiler Trace. Before I started](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=21.968599999999988) [this demo, I ran another replay, this time](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=24.166399999999996) [adding the -o parameter. I then went and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=27.66613333333332) [made the index changes, and then ran](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=30.890769230769227) [another replay, again with the -o](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=33.471615384615376) [parameter. I had Extended Event sessions](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=35.62136363636364) [running the entire time, and Query Store](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=37.739909090909094) [was enabled on the target database. The](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=41.260000000000005) [output files from the replay's automatic](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=44.86966666666667) [trace are found under the DReplayClient's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=47.52566666666667) [folder, that's under Program Files x86 SQL](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=50.36111111111111) [Server. Same place its logs are found,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=54.71588888888888) [same place the configuration files are](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=57.464307692307706) [found. The file is called ReplayResult.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=59.59061538461541) [trc, there will be one on every client](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=62.039615384615395) [that was used to run the replay, and be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=65.391) [careful here; if you run a replay with the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=68.37720000000002) [-o parameter and a file already exists, it](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=71.85407142857143) [will be overwritten. I've copied all four](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=75.81692857142859) [of my results files to my database server,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=78.40266666666668) [that's two from the replay that I ran](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=80.602) [before the changes, and two from the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=82.46999999999994) [replay that I ran after the changes, I ran](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=84.2452) [the replays with two clients. The easiest](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=87.61300000000001) [way to analyze them is to load them into a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=89.90871428571428) [database table. To do that, you open them](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=92.03228571428572) [with Profiler, double-click them, they](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=94.06199999999998) [will open with Profiler automatically,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=95.44045454545456) [wait for the trace to finish reading, and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=96.98272727272732) [then save it to a table. Again, watch the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=99.72433333333332) [name here, if the table already exists, it](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=102.90946153846156) [will be dropped and recreated; and I'll go](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=105.00669230769236) [and do the same with the other four files.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=108.34019999999998) [This is an example of a query that can be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=112.554) [used to analyze the results from those](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=114.3826666666667) [files. This isn't perfect. The fact that](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=116.137) [I'm aggregating on the text data assumes](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=119.07700000000001) [that all my queries are parameterized. In](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=121.70245454545457) [this case they are, but if they're not,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=124.12857142857143) [you're going to find that the text data](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=126.39714285714291) [has the parameter values in them, and so](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=128.84860000000003) [you can't aggregate easily. This is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=131.6048666666668) [another disadvantage of the Profiler](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=133.58445454545455) [trace, there's no easy way to aggregate ad](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=135.0880909090909) [hoc queries. The top four queries by](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=138.19599999999997) [execution count are the four that I'm](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=141.52974999999992) [interested in, and I can see from the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=143.32514285714282) [duration that my index change might've](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=145.084) [improved the third one, and it hasn't done](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=146.8564) [anything for the other two. I don't have](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=148.9704444444444) [many of the other COMs I'd normally use to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=150.82899999999998) [analyze performance results here. That's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=152.90799999999993) [because of how the Profiler Trace is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=154.33820000000003) [created, I can't change the columns in it,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=156.47442857142858) [I get what is built-in, and that's pretty](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=159.17385714285717) [much just the duration in terms of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=161.95225000000002) [performance characteristics. Onto the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=164.4985000000001) [Extended Events. I have two files here,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=165.94107692307693) [one from each replay that I ran, and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=168.4438461538462) [again, the easiest way to analyze these is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=170.9851428571429) [to load them into a database table,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=173.20742857142872) [double-click, they open with Management](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=175.15) [Studio this time. From the Extended Events](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=176.537) [menu, I can export them to a table, do](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=178.84000000000006) [that for the second file as well, and then](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=182.01039999999998) [this is an example query that I can use to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=185.59959999999992) [analyze this result. Here, I can group by](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=189.77100000000007) [the query hash because that is guaranteed](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=192.81457142857144) [to be the same for all queries of the same](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=195.29057142857147) [form, no matter what their parameter](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=198.4576923076924) [values are. So in this case, I'm grouping](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=200.32115384615386) [by the query hash or the object name.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=202.93038461538472) [Object name if it's a stored procedure,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=205.375) [query hash if it's an ad hoc query; and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=207.37) [since this was an Extended Events session](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=209.82057142857144) [that I created, I added CPU time and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=211.87249999999997) [logical reads, and so I can aggregate](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=214.63449999999992) [those and analyze them as well, and I can](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=216.55) [see that I very definitely improved the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=218.75500000000005) [third query. The CPU time is lower, the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=221.15699999999998) [logical reads are lower. Lastly, I can](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=224.83819999999994) [have a look at Query Store, and while](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=227.49460000000002) [there are a number of ways to have a look](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=229.3122000000001) [at the queries, I'm just going to use the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=231.52037500000006) [top resource consumers report, and see](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=233.46943750000014) [whether any of the queries got a new plan](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=235.03266666666661) [after I added the indexes, and the first](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=237.61506666666668) [one did, and I can see that the new plan](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=240.40333333333336) [is definitely more stable. I'm not so](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=243.9637777777778) [certain it's faster, but it is certainly](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=246.66200000000003) [more stable. That concludes our test of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=249.56466666666677) [index changes using Distributed Replay.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=252.48450000000005) [The result is fairly inconclusive. If this](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=254.575) [was an actual system, I probably wouldn't](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=256.7978181818182) [deploy these to be honest, but for a demo, this at least shows the process.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=4&mode=live&start=258.88325)

[**Summary**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=5&mode=live)

[In this module, we discussed the replay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=5&mode=live&start=1.674) [process. We started with a discussion of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=5&mode=live&start=5.257124999999999) [the destination database, of the point in](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=5&mode=live&start=7.497000000000002) [time to which it needs to be restored. We](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=5&mode=live&start=9.53211111111111) [went through the replay process itself -](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=5&mode=live&start=12.276) [the command line options, the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=5&mode=live&start=14.284999999999993) [configuration file options, and all of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=5&mode=live&start=15.7693) [their meanings - and finally, we looked at](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=5&mode=live&start=17.787100000000006) [the options for monitoring the results of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=5&mode=live&start=19.94391666666667) [the trace, the automatic Profiler Trace,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=5&mode=live&start=21.551) [Extended Events, and the Query Store. In](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=5&mode=live&start=24.589499999999997) [the next module, I'll wrap up the entire](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=5&mode=live&start=27.869285714285713) [course, and list a few options for further study and further reading. See you there.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=eca95cab-37ef-4c4a-86c1-43e808d07f90&clip=5&mode=live&start=29.799571428571415)

[**Summary and Further Reading**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live)

[**Recap and Additional Material**](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live)

[Hi, and welcome to the final module in](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=0) [this course on Simulating Production](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=3.816) [Workloads with SQL Server Distributed](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=6.289714285714286) [Replay. Let's recap everything that we've](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=9.118285714285715) [covered in this course. We started by](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=11.725666666666665) [installing the DReplay components. One](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=14.726571428571429) [controller, one or more clients, four of](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=16.89) [them in our case, and Management Studio,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=19.27) [so that we could get the DReplay](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=21.965750000000003) [executable installed. We then went and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=25.082500000000014) [configured the security and firewall](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=27.446600000000004) [rules. Distributed COM security for the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=29.28860000000001) [controller, adding its service account to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=31.433111111111103) [the launch and activation permissions, as](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=33.34483333333333) [well as to the Distributed COM user's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=34.81733333333331) [group; and then inbound firewall rules for](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=37.05981818181817) [the controller and for all the clients to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=40.001727272727244) [allow them to communicate with each other.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=43.26699999999999) [We used SQL Server Profiler to generate](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=46.112) [the trace script, since DReplay needs the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=48.2365) [older trace file format, not an Extended](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=50.716846153846156) [Events session. We modified the script to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=53.46407692307693) [change the file size, file name, and end](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=55.59127272727273) [time for the trace; and then we ran the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=57.675066666666666) [trace script to start capturing the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=59.80386666666667) [workload. Once the workload was captured,](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=61.55436363636363) [we ran it through the DReplay executable](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=63.96745454545453) [using the preprocess option to generate](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=66.74440000000001) [the working files that the replay needs.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=69.1) [We then ran the replay. First, with a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=72.85433333333332) [default configuration file setting, and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=76.46927272727272) [then twice more; once in synchronized mode](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=78.02472727272726) [and once in stress mode with the timescale](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=79.99866666666665) [turned down, so that we could see how](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=82.08) [those differed. Finally, we took the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=86.15680000000005) [captured results from the replays, using](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=88.53333333333332) [the built-in Profiler Trace, our Extend](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=90.5818888888889) [Events sessions, and the Query Store; and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=92.69322222222226) [we compared them to see whether the index](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=94.6789230769231) [changes that we were making were](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=96.73) [effective. It's been a fairly long ride to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=99.78228571428575) [get to this point, but keep in mind that](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=101.68260000000004) [most of this work is in the installation](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=103.54545454545455) [and configuration, and that only has to be](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=105.72509090909095) [done once. I usually set up and configure](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=107.94314285714289) [DReplay on any machine that I'm using, the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=110.174) [controller and the single client all on](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=112.37466666666663) [the same machine, for when I want to run](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=114.26607692307692) [processes multiple times to test something](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=116.63930769230771) [out. I hope that you'll get a lot of use](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=118.24692857142857) [out of SQL Server's DReplay feature in](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=121.19755555555555) [future. Before I end this course, I have a](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=124.91844444444445) [few suggestions for further reading and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=127.36384615384618) [further viewing. Firstly, over at the MSDN](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=129.02375) [blogs, there are two very good, very](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=132.27000000000004) [detailed blog posts on configuring](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=135.679) [Distributed Replay. These were written by](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=138.269) [Microsoft engineers, and they were among](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=140.35445454545453) [the first blog posts to be written on](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=141.92863636363631) [DReplay. They cover all of the](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=145.08112499999993) [installation and configuration steps, and](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=147.20566666666664) [a lot of the more common error messages](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=148.9173333333333) [that you'll get if the configuration is](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=151.04450000000006) [not correct. The second resource that I](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=152.81184615384615) [want to call out is Jonathan Kehayias's](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=155.08576923076922) [blog. His entire blog is fantastic, but if](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=157.554) [you're working with Distributed Replay, I](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=160.92999999999998) [would suggest you especially look at his](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=162.9355) [Distributed Replay category. He has a lot](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=165.06746153846154) [of posts on the error messages that](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=166.98707692307693) [DReplay can throw, and on specific uses to](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=169.02925000000005) [which he's put the tool; and then here at](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=171.54991666666683) [Pluralsight, there are a couple of videos](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=174.51585714285716) [which I think will be useful for you. For](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=176.825) [Query Store, I only touched on it in this](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=179.6339375) [course, but I do have an entire course on](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=181.802375) [using Query Store for solving real world](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=184.71990909090906) [problems; and then if you're not too](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=188.15436363636354) [familiar with Extended Events, there is an](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=189.85423076923078) [excellent course on the basics of Extended](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=191.265) [Events here. Thank you for taking this](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=194.4834444444445) [journey with me. I hope you've enjoyed](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=196.49237499999995) [this course, and I hope to see you again in a future course. Goodbye.](https://app.pluralsight.com/player?course=sql-server-distributed-replay&author=gail-shaw&name=7ccf062c-1d26-4f29-9670-acd280cc5a91&clip=0&mode=live&start=198.03447058823534)